

### EXAMINER'S AMENDMENT

An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Steven Highlander on April 7, 2009.

The application has been amended as follows:

In the claims:

1. (currently amended) A method for detecting endotoxin, comprising the steps:
  - a) incubating a sample in the presence of divalent cations with an isolated p12 bacteriophage tail protein, and
  - b) detecting endotoxin bonded to said bacteriophage tail protein, ~~in the presence of divalent cations.~~
4. (currently amended) A method for removing endotoxin from a sample, comprising the steps:
  - a) incubating a sample with or bringing a sample in contact with divalent cations and an isolated p12 bacteriophage tail protein, said p12 bacteriophage tail protein being ~~immobilised~~ immobilized on a permanent carrier, non-specifically or directly, ~~in the presence of bivalent ions,~~
  - b) separating p12 bacteriophage tail protein-endotoxin complex from the samplewherein the permanent carrier comprises filtration media, glass particles, magnetic particles, agarose particles, sedimentation materials or filling materials for chromatography columns.

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5. (currently amended) The method according to claim 4, wherein steps a) and b) are implemented in a chromatography column ~~throughflow~~ flowthrough method.
11. (currently amended) The method according to claim 1, wherein the p12 bacteriophage tail protein further comprises a Strep-tag or a His-tag.
12. (currently amended) The method according to claim ~~[[1]]~~ 11, wherein the tag comprises an amino acid sequence according to SEQ ID NO. 5, 6, or 7.
13. (currently amended) The method according to claim 1, wherein the p12 bacteriophage tail protein is p12 protein of phage T4 and further comprises a Strep-tag or a His-tag.
14. (currently amended) The method according to claim 1, wherein the ~~bivalent~~ divalent cations are  $\text{Ca}^{2+}$  in the range of 0.1  $\mu\text{M}$  to 10 mM.
15. (currently amended) The method according to claim 1, wherein detecting comprises detecting displacement of a prebound fluorescence-marked endotoxin from said p12 bacteriophage tail protein of a).
16. (currently amended) The method according to claim 4, wherein the p12 bacteriophage tail protein further comprises a Strep-tag or a His-tag.
17. (currently amended) The method according to claim ~~[[4]]~~ 16, wherein the tag comprises an amino acid sequence according to SEQ ID NO. 5, 6 or 7.
18. (currently amended) The method according to claim 4, wherein the p12 bacteriophage tail protein is p12 protein of phage T4 and further comprises a Strep-tag or a His-tag.

The following is an examiner's statement of reasons for allowance: claims 1-5, 7-18 are drawn to a method for detecting endotoxin comprising the steps of a) incubating a sample, in the

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presence of divalent ions, with an isolated p12 bacteriophage tail protein and b) detecting endotoxin bonded to said bacteriophage tail protein. The detection methods can be found in the specification, for example on pages 11-12. A search of the prior art reveals that the instant claims are novel. Further, the prior art does not suggest the invention as claimed and is therefore, non-obvious.

Claims 1-5, 7-18 are allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marsha M. Tsay whose telephone number is (571)272-2938. The examiner can normally be reached on M-F, 9:00am-5:00pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jon Weber can be reached on 571-272-0925. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished

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/Maryam Monshipouri/

Primary Examiner, Art Unit 1656

April 7, 2009